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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/646,459	08/22/2003	Jeffrey Ying	156886-0060	8497
29000	7590	09/11/2007		
IRELL & MANELLA LLP 1800 AVENUE OF THE STARS SUITE 900 LOS ANGELES, CA 90067			EXAMINER COULTER, KENNETH R	
			ART UNIT	PAPER NUMBER
			2141	
			MAIL DATE	DELIVERY MODE
			09/11/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/646,459	Applicant(s) YING, JEFFREY	
	Examiner Kenneth R. Coulter	Art Unit 2141	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 05 June 2007 (RCE filed).
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1 and 40-83 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1 and 40-83 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date <u>6/5/07; 7/11/07</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1 and 40 – 83 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rode et al. (U.S. Pat No. 6,643,689) (Process and Components for Controlling the Connections of a Transmission System) in view of Pincus et al. (U.S. Pat. No. 6,282,583) (Method and Apparatus for Memory Access in a Matrix Processor Computer).

- 2.1 Regarding claim 1, Rode discloses a matrix control network, comprising:
 - a hierarchical control network, said hierarchical control network comprising a plurality of data bases and a plurality of control network nodes arranged in a hierarchical structure, each of the data bases communicatively coupling one or more of said control network nodes (Figs. 1, 2; col. 1, lines 35 – 47; col. 3, lines 16 – 30); and
 - a supervisory communication, said supervisory network comprising a supervisory communication bus and a plurality of supervisory nodes

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communicatively coupled to said supervisory communication bus, each of said supervisory nodes configured to monitor at least one of the data buses of said hierarchical control network (Figs. 1, 2; col. 1, lines 35 – 47; col. 3, lines 16 – 30). However, Rode does not explicitly disclose “a supervisory communication bus **physically distinct from the data buses**”.

Pincus discloses a supervisory communication bus physically distinct from the data bus (Figs. 7, 9; col. 12, lines 21 – 40; col. 16, line 65 – col. 17, line 6).

It would have been obvious to one of ordinary skill in the art at the time of the invention to combine the bus architecture of Pincus in Rode because the utilization of separate control and data buses is a commonplace technique that helps optimize data and control information distribution.

2.2 Per claim 40, Rode teaches the matrix control network of claim 1, wherein at least one of the control network node communicatively coupled to a given data bus is configured to operate as a master node and the other control network nodes communicatively coupled to that data bus are configured to operate as slave nodes (Figs. 1, 2; col. 1, lines 35 – 47; col. 3, lines 16 – 30).

2.3 Regarding claim 41, Rode discloses the matrix control network of claim 40, wherein each of said supervisory nodes comprises a supervisory node slave unit and a supervisory node master unit, said supervisory node slave unit connected to one of said data buses of said hierarchical control network, and

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said supervisory node master unit connected to said supervisory communication bus (Figs. 1, 2; col. 1, lines 35 – 47; col. 3, lines 16 – 30).

2.4 Per claim 42, Rode teaches the matrix control network of claim 41, wherein the master node for each data bus systematically polls the slave nodes connected to the data bus (col. 3, line 60 – col. 4, line 20).

2.5 Regarding claim 43, Rode discloses the matrix control network of claim 42, wherein the master node for each data bus polls the supervisory node slave unit of the supervisory node connected to the data bus (col. 3, line 60 – col. 4, line 20).

2.6 Per claim 44, Rode teaches the matrix control network of claim 43, wherein the supervisory node slave unit of each supervisory node refrains from transmitting over the data bus to which the supervisory node is connected unless authorized by the master node connected to the data bus (Fig. 7; col. 7, lines 34 – 48).

2.7 Regarding claim 45, Rode discloses the matrix control network of claim 1, wherein a supervisory node detecting an error or exception condition transmits an alert message over said supervisory communication bus (col. 2, lines 20 – 24).

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2.8 Per claims 46 – 83, the rejection of claims 1 and 40 – 45 under 35 USC 103(a) (paragraphs 2.1 – 2.7 above) applies fully.

Response to Arguments

3. Applicant's arguments with respect to claims 1 and 40 – 83 have been considered but are moot in view of the new ground(s) of rejection.

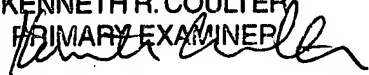
4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kenneth R. Coulter whose telephone number is 571 272-3879. The examiner can normally be reached on M - F, 7:30 am - 4 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rupal Dharia can be reached on 571 272-3880. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

KENNETH R. COULTER
PRIMARY EXAMINER



krc